Claims:

- 1. Process for the manufacture of a molding comprising the steps:
- a) preparing an aqueous solution comprising a water-soluble prepolymer having crosslinkable groups and a further polymer which is devoid of crosslinkable groups,
- b) introducing the solution obtained into a mold,
- c) triggering the crosslinking, and
- d) opening the mold such that the molding can be removed from the mold.
- 2. A process according to claim 1, wherein the crosslinkable prepolymer having crosslinkable groups is a derivative of a polyvinyl alcohol having a molecular weight of at least about 2 000 that, based on the number of hydroxy groups of the polyvinyl alcohol, comprises from approximately 0.5 to approximately 80 % of units of formula

$$\begin{array}{c|c}
CH_2 & CH_2 \\
CH & CH
\end{array}$$

$$\begin{array}{c|c}
CH_2 & CH_2 \\
\hline
CH & R_1 \\
\hline
R & N
\end{array}$$

$$\begin{array}{c|c}
R_1 & R_2 \\
\end{array}$$

$$\begin{array}{c|c}
R_2 & CH_2 \\
\hline
\end{array}$$

wherein R is C₁-C₈-alkylene, R₁ is hydrogen or C₁-C₇-alkyl and R₂ is an olefinically unsaturated, electron-attracting, copolymerizable radical preferably having up to 25 carbon atoms.

3. A radical according to claim 2, wherein R₂ is a radical of formula

-CO-NH-
$$(R_4$$
-NH-CO-O)_q- R_5 -O-CO- R_3 (2),

wherein q is zero or one and R_4 and R_5 are each independently C_2 - C_8 -alkylene, C_6 - C_{12} -arylene, a saturated divalent C_6 - C_{10} -cycloaliphatic group, C_7 - C_{14} -arylenealkylene or C_7 - C_{14} -alkylenearylene or C_{13} - C_{16} -arylenealkylenearylene, and R_3 is C_2 - C_8 -alkenyl.

4. A process according to claim 2, wherein R is C_1 - C_4 -alkylene, R_1 is hydrogen or C_1 - C_4 -alkyl, and R_2 is a radical R_3 -CO-, in which R_3 is C_2 - C_4 -alkenyl.

- 5. A process according to claim 1, wherein the further polymer being devoid of a polymerizable group in step a) is a polymer that forms a clear aqueous solution together with the prepolymer having crosslinkable groups.
- 6. A process according to claim 1, wherein the further polymer being devoid of a polymerizable group in step a) is a polyacrylamide, N,N-dimethyl acrylamide, polyvinyl pyrrolidone or a polyoxyethylene derivative.
- 7. A process according to claim 1, wherein the further polymer being devoid of a polymerizable group in step a) is a polyethylene-polypropylene block copolymer.
- 8. A process according to claim 1, wherein the further polymer being devoid of a polymerizable group in step a) is present in the aqueous solution in an amount of from 0.5 to 10 % by weight, based on the entire weight of the aqueous solution.
- 9. A process according to claim 1, wherein according to step c) the prepolymer is photocrosslinked in the presence of a photoinitiator.
- 10. A process according to claim 9, wherein the photocrosslinking is carried out for a time period of less than five minutes.
- 11. A process according to claim 1 for the manufacture of a biomedical molding.
- 12. A molding obtainable by the process of claim 1.
- 13. A process according to claim 1, wherein the further polymer being devoid of a polymerizable group in step a) is present in the aqueous solution in an amount of from 0.5 to 3 % by weight, based on the entire weight of the aqueous solution.
- 14. A process according to claim 11, wherein the biomedical molding is a contact lens, intraocular lens or artificial cornea.